## **CLAIMS:**

1. A dental crown formed of a thermoplastic polymer material, said crown comprising:

a tooth shaped top surface; and

flexible side surfaces, at least one of which includes inwardly directed bottom portion.

- 2. A dental crown according to claim 1, wherein said thermoplastic polymer material comprising a polymer selected from polyacetal, polyacrylate, polymethylmethacrylate (PMMA), polyamide, polyaryletherketone (PAEK), polyetherketone (PEK), polyetheretherketone (PEK), polyetherimide (PEI), polyethersulfone (PES), polysulfone (PSU), and mixtures thereof.
- 3. A dental crown according to claim 2, wherein said thermoplastic polymer is a homo- or co-polymer of acetal resin, polyetheretherketone (PEEK) or polymethylmethacrylate (PMMA).
- 4. A dental crown according to claim 1, wherein said thermoplastic polymer material further comprising at least one of the following: fibers, fillers, pigments and reinforcements.
- 5. A dental crown according to claim 1, formed by injection molding.
- 6. A dental crown according to claim 5, produced by mass production injection molding comprising:

providing a multi-element mold; and

employing the multi-element mold to injection mold a dental crown from a thermoplastic polymer material.

- 7. A dental crown according to claim 6, wherein said multi-element mold includes an ejector, which is being operated to eject the molded crown following opening the multi-element mold.
- 8. A dental crown according to claim 1, formed by compression molding.
- 9. A dental crown according to claim 1, formed by machining.